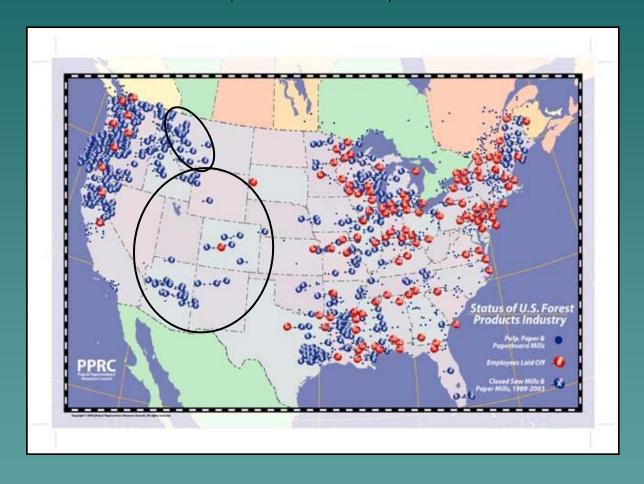
#### Biomass and Infrastructure

Smurfit-Stone Container March 1, 2006

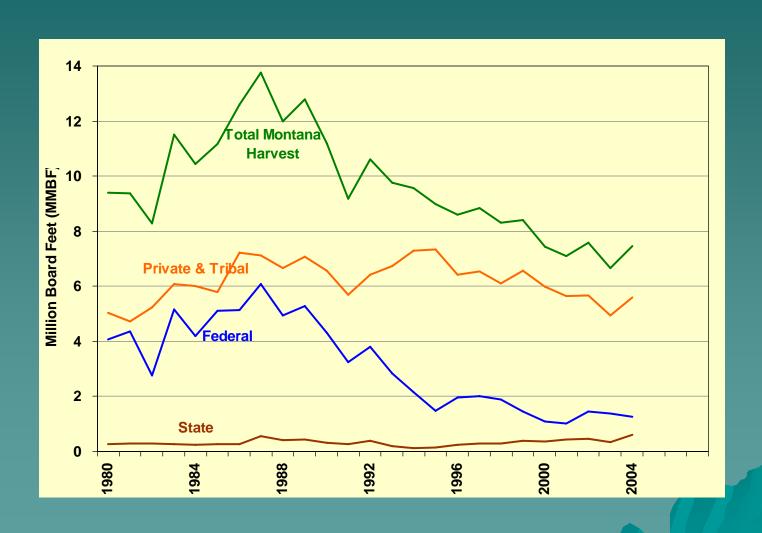
- Concern: Infrastructure
- Frustration: Forest Health and Sustainability
- What to do: Desired Future Condition

### CONCERNS

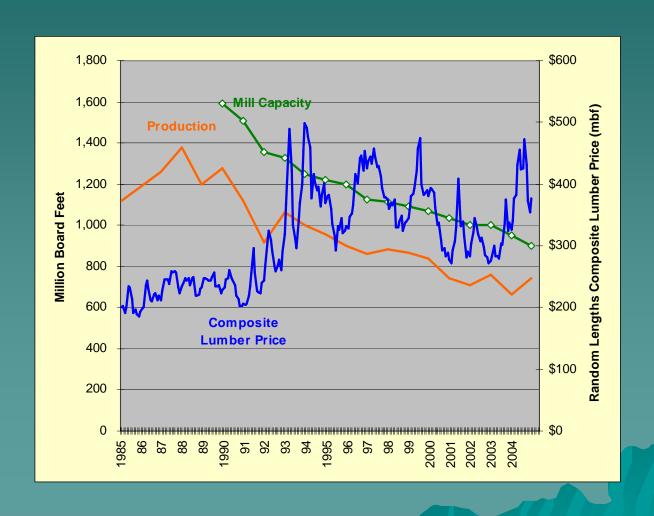
Loss of Infrastructure (1989-2003)



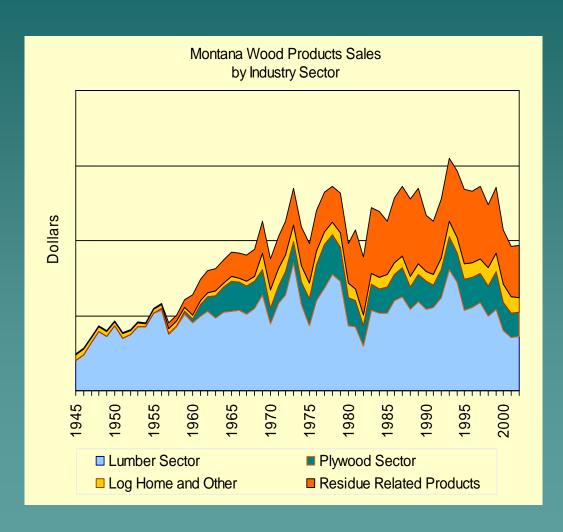
#### Montana Annual Timber Harvest



## Decline in Montana Mill Capacity Supply or Demand Limited?



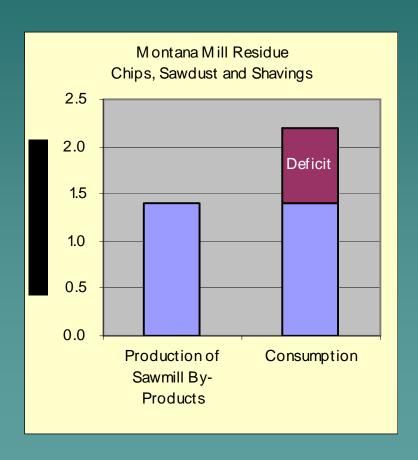
# Infrastructure is more than sawmills A symbiotic relationship ...



- Mill Residue:
  - Chips
  - Sawdust
  - Shavings
  - Bark
- Wood Residue Converting Facilities:
  - Particleboard
  - Medium Density Fiberboard
  - Paper
  - Wood Pellets
  - Beauty Bark
  - Hogfuel Boilers
  - Firewood
- Logging Community
- Truckers

#### Infrastructure is more than sawmills

The decline in Montana's timber harvest impacts mill residue.



# Not everyone does everything but everyone does something.





#### **Smurfit-Stone Container Corporation**

	<u>Loads/Ye</u>	<u>Loads/Yea</u> r*	
<b>•</b>	Wood Chips	34,000	135
<b>•</b>	<u>Pulplogs</u>	16,000	75**
<b>•</b>	Total Fiber	50,000	210

Hogfuel 13,000\*\*\* 50

<sup>\*\*\*</sup> Includes bark from chipper



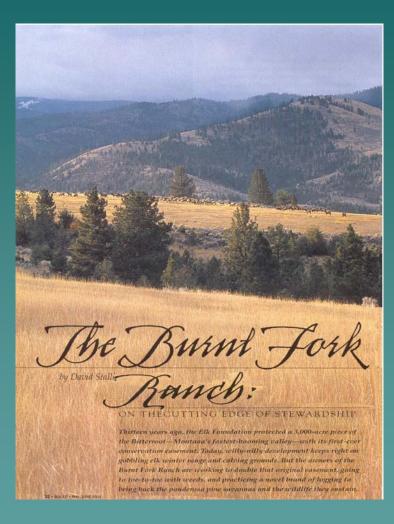
<sup>\*</sup> Log truck equivalent of 27 Tons/Load

<sup>\*</sup> Does not include two months down for spring breakup.

### **FRUSTRATION**

Infrastructure is tied to forest management.

## We all want the same thing from our Forests. The question is how to get there.

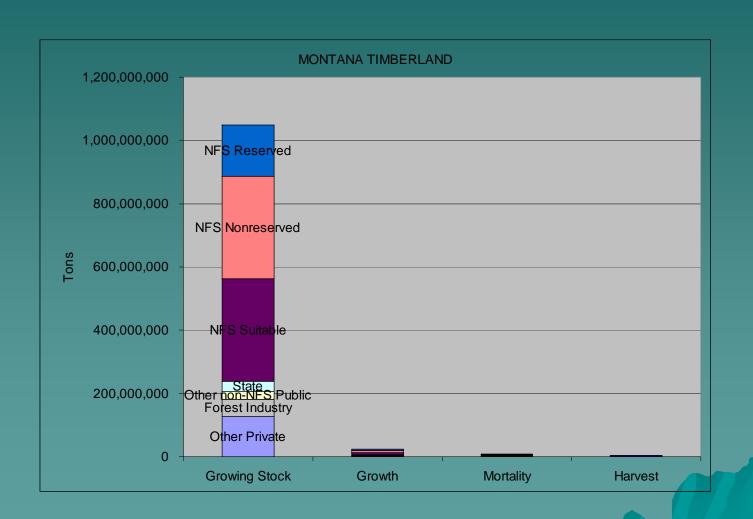


- Wildlife
- Aesthetics
- Old growth
- Recreation
- Clean water
- Clean air
- Sustainable forest

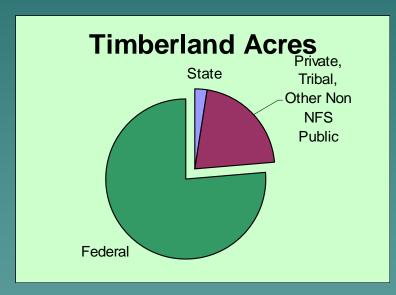


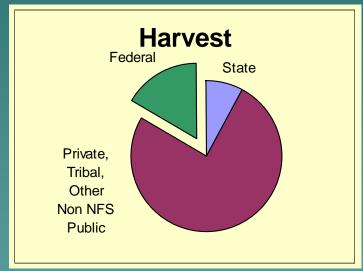
#### **Growth and Mortality**

Adding millions of tons to the forest every year.



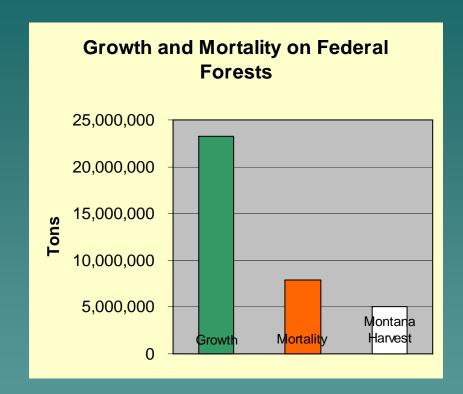
## Contribution to Montana's Wood Products Infrastructure by Ownership





#### Disturbance Ecology

The forest has changed.



- Not sustainable.
- Unbalanced, unnatural
- Headed for a crash.
- We have a lot of work to do.



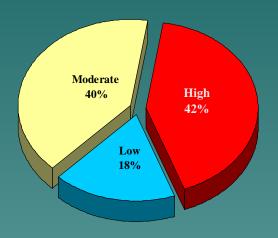




#### Disturbance Ecology

Moving away from the normal fire cycle.

#### **Montana Forest Lands by Fire Hazard**



- Far more older-age timber stands than occurred historically.
- Increased stand density
- Prolonged drought
- Insects and Disease
- Not sustainable
- 23 million forested acres
- ◆ 18 million at moderate to high risk







# How Will The System Return to Balance?

It's a choice.

#### The Cost of Doing Nothing

Catastrophic fire affects more than trees ...



- Old Growth
- Age Class Diversity
- Wildlife
- Endangered Species
- Erosion
- Air quality
- Recreation
- Water and sedimentation introduction to streams
- Forest succession
- Sustainability
- Etc.





# What do we want the forest to look like in 20 years? ...50 years?



- Focus on what is left.
- Restore Disturbance Activities
- Recognize the tools of forest management:
  - Sawlogs, pulplogs, slash and fire.

### Summary

- ◆ The infrastructure is more than sawmills.
  - Inter-reliance
  - At risk
- Montana forests are at risk.
  - The system will find balance.
  - Fire Kills.
- Infrastructure and forest management are interreliant.
  - The silvicultural tools of forest management are Montana's wood products.

## Summary (continued)

- What to do?
  - Maintain infrastructure
    - ◆ Infrastructure and Forest Management are tied together
    - The tools of forest management are sawlogs, pulplogs, slash, etc
    - ♦ It is not just sawmills. It is log homes and posts and poles and particleboard and paper and logging and trucking and ...
  - We have a lot of work to do
    - ◆ Restore disturbance activities to the forest.
    - Quit poking around at the edges.
    - ♦ 18 million acres
    - → Harvest 500mmbf annually from Montana federal lands.
    - ♦ Recognize supply is the limiting factor, not demand.
  - Promote capital investment in wood products
    - → Expand and stabilize supply.

